>

REPORT CARD
ON HEALTH
IN WASHINGTON 2005

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Public Health Improvement Partnership

Project Contacts:

Joan Brewster, Director
Public Health Systems Planning and Development
Washington State Department of Health
(360) 236-4062

Juliet Van Eenwyk, State Epidemiologist for Non-Infectious Conditions
Epidemiology, Health Statistics, and Public Health Laboratories
Washington State Department of Health
(360) 236-4250

Key Health Indicators Committee: Project Leads:

Ward Hinds, Co-chair
Snohomish Health District

Jude Van Buren, Co-chair
Washington State Department of Health
Epidemiology, Health Statistics, and Public Health Laboratories

Members:

Barbara Andrews*
Yakima Health District

Bobbie Berkowitz
Turning Point

Joan Brewster
Washington State Department of Health
Public Health Systems Planning and Development

Marie Flake
Washington State Department of Health
Public Health Systems Planning and Development

Maxine Hayes
Washington State Department of Health
Health Officer

Josh Jones
Northwest Portland American Indian
Health Board

Heidi Keller
Washington State Department of Health
Office of Health Promotion

Carrie McLachlan
Island County Health Department

Riley Peters
Washington State Department of Health
Maternal and Child Health

Suzanne Plemmons
Kitsap County Health District

Katharine Sanders
Washington Health Foundation

Katrina Wynkoop Simmons
Washington State Department of Health Center
for Health Statistics

David Solet
Public Health—Seattle & King County

Christie Spice
Washington State Department of Health
Epidemiology, Health Statistics, and Public
Health Laboratories

Art Starry
Thurston County Public Health and Social
Services Department

Juliet VanEenwyk
Washington State Department of Health
Epidemiology, Health Statistics, and Public
Health Laboratories

Lyndia Vold
Spokane Regional Health District

Staff:

Lillian Bensley, Epidemiologist
Washington State Department of Health
Epidemiology, Health Statistics, and Public Health
Laboratories

Donna Russell
Washington State Department of Health
Public Health Systems Planning and Development

*Has completed term

For additional copies of this document, or to obtain this document in an alternative format, please contact:

Simana Dimitrova, Administrative Assistant
Public Health Systems Planning and Development
Washington State Department of Health
PO Box 47890
Olympia, WA 98504-7890
(360) 236-4085

What is a Report Card on Health?

Since 1999, the Public Health Improvement Partnership's Key Health Indicators Committee has reviewed a multitude of possible measures, studied the work of several states, and sifted through the data thoughtfully and carefully. The goal is to answer the question "How healthy are we?" Therefore, the report card was developed to take a deeper look at health, focusing on the "determinants of health" and measuring those that have the greatest impact on our health. The contribution of medical care is important, and it is essential when a person becomes ill. But other factors have a much greater impact on our overall health, including personal behaviors, such as smoking and physical activity and the social and physical environment in which we live.

Who is being graded?
All of Washington state.

What is being graded?
Overall health and factors in our environment, communities, families, and ourselves that affect health.

How are we grading?
We are looking at more than 50 measures. The grades reflect how we compare to the United States, if we are getting better or worse over time, and how well we are doing to eliminate health disparities among our different racial/ethnic populations.

Why are we putting out a report card?
This report card is intended to inform and stimulate state and community discussion, as well as policy development and action, by providing solid information that will lead to more focused actions, and ultimately, better health.

The report card will be updated with new data every two years to identify areas that need addressing for improving health in Washington. The report card website will provide information on each of the measures and grading components.

The report card, along with a complete description of the grading criteria, the rationale for assigning each grade, the indicator definitions and data sources, and the data tables can be found at: www.doh.wa.gov/reportcard.

The indicators fall into the following categories:

1. How healthy are we overall?
2. How safe and supportive are our surroundings?
3 How safe and supportive are our communities?
4. How supportive is our health care system?
5. How safe and supportive are our families?
6. How healthy are our behaviors?

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1. How Healthy Are We Overall?

Category	Indicators	Compared to U.S.	Trend	Disparities	Final
How good is our general physical and mental health?	Expected years of healthy life at age 20	A	F	B	C
	Percent of adults who report 14 or more days of poor mental health in the past month	B	D	C	C
Overall Grade	Although Washington compares favorably to the U.S. on healthy life expectancy and mental health, there are moderate levels of disparities and indications that larger proportions of Washington residents are experiencing poor physical and mental health.				C
Are we a healthy weight?	Percent of adults who are obese	B	F	C	C
	Percent of 10th graders who are overweight	B	NA*	B	B
Overall Grade	Washington has relatively fewer obese adults and overweight 10th graders compared to the U.S. Nonetheless, in 2004 about one in five adults reported heights and weights indicating obesity. About 10% of 10th graders were overweight in 2004. Washington's rates are moving in the wrong direction and we have moderate levels of disparities.				C

2. How Safe and Supportive Are Our Surroundings?

Category	Indicators	Compared to U.S.	Trend	Disparities	Final
Do we have illnesses commonly associated with unsafe food, unsafe water, and poor hygiene?	Rate of campylobacteriosis per 100,000 population	NA	A	NA	A
	Rate of E. coli O157:H7 infection per 100,000 population	F	A	NA	C
	Rate of giardiasis per 100,000 population	NA	A	NA	A
	Rate of listeriosis per 100,000 population	C	A	NA	B
	Rate of salmonellosis per 100,000 population	A	A	B	A

*NA = Currently not available

2. How Safe and Supportive Are Our Surroundings? (Continued)

Category	Indicators	Compared to U.S.	Trend	Disparities	Final
Do we have illnesses commonly associated with unsafe food, unsafe water, and poor hygiene?	Rate of shigellosis per 100,000 population	A	A	C	B
	Rate of vibriosis (non-cholera) per 100,000 population	NA	C	NA	C
	Rate of yersiniosis per 100,000 population	NA	A	NA	A
Overall Grade	Except for rates of E. coli O157:H7, Washington's rates of illness associated with unsafe food, unsafe water and poor hygiene are the same or lower than those in the U.S. For all illnesses except vibriosis, Washington's rates are decreasing or there have been three or fewer reports for the last three years. Because of the small number of reports or missing race and ethnicity data, most of these indicators do not have grades for disparities.				B
Do we have clean drinking water?	Of the population whose homes receive water from Group A public water systems, the percent on systems in compliance with nitrate monitoring requirements	NA	A	NA	A
	Of the population whose homes receive water from Group A public water systems, the percent on systems in compliance with quality standards for nitrates	A	A	NA	A
	Of the population whose homes receive water from Group A public water systems, the percent on systems in compliance with coliform monitoring requirements	NA	C	NA	C
	Of the population whose homes receive water from Group A public water systems, the percent on systems in compliance with quality standards for coliform bacteria	A	A	NA	A
	An indicator for Group B systems is under development	UNDER DEVELOPMENT			
Overall Grade	Based on available data, Washington residents on group A systems have safe drinking water.				B
Do we have clean air to breathe?	Percent of population breathing air that is meeting the National Ambient Air Quality Standards (NAAQS)	A	A	A	A
Overall Grade	Based on the NAAQS, Washingtonians enjoy good air quality. However, U.S. Environmental Protection Agency staff has recommended strengthening the NAAQS for very small particles to protect health. Washingtonians may breathe unhealthy air due to natural events, such as windblown dust, or due to air pollutants that are not regulated in the NAAQS, such as fine particles specifically from diesel exhaust and benzene.				A

*NA = Currently not available

3. How Safe and Supportive Are Our Communities?

Category	Indicators	Compared to U.S.	Trend	Disparities	Final
Do our incomes meet basic financial needs?	Percent of people living below the U.S. poverty level.	C	F	C	D
Overall Grade	The percent of people living below the U.S. poverty level seems to be increasing. There are moderate levels of disparities.				D
Are we connected to our communities?	Percent of adults reporting that most people can be trusted	A	NA	B	B
	Percent of high school students dropping out of school	NA	C	C	C
	Rate of serious violent crime offenses per 100,000 population	A	A	F	B
Overall Grade	Washington has relatively low crime and high social trust. However, there are large race/ethnic disparities in reported violent offenses.				B
Are we getting injured unnecessarily?	Unintentional motor vehicle deaths per100,000 population	A	A	D	B
	Unintentional poisoning deaths per 100,000 population	F	F	F	F
	Unintentional drowning deaths per 100,000 population	D	A	B	B
	Unintentional fall-related deaths among persons 65 years and older per 100,000 population	F	F	B	D
Overall Grade	Except for motor vehicle deaths, Washington death rates from unintentional injury are higher than the U.S. rates. While rates for motor vehicle and drowning deaths have been decreasing, rates have increased for poisoning and falls among person ages 65 and older. There are high levels of disparities for motor vehicle deaths and poisoning.				C

**NA = Currently not available*

4. How Supportive Is Our Health Care System?

Category	Indicators	Compared to U.S.	Trend	Disparities	Final
Are we able to get medical care when we need it?	Percent of households with people unable to obtain health care or experiencing a delay in obtaining health care	NA	NA	B	B
Overall Grade	With only one grading component and one indicator, this subject cannot be graded.				NA
Do we have illnesses that could be prevented by immunization?	Rate of hepatitis A per 100,000 population	A	A	B	A
	Rate of hepatitis B per 100,000 population	B	B	NA	B
	Rate of measles per 100,000 population	C	C	NA	C
	Rate of mumps per 100,000 population	B	A	NA	B
	Rate of pertussis per 100,000 population	D	F	NA	F
	Rate of polio per 100,000 population	A	A	A	A
	Rate of rubella per 100,000 population	A	C	A	B
	Rate of tetanus per 100,000 population	A	A	A	A
Overall Grade	Grades for vaccine preventable disease vary depending on the disease. Washington sees no or few cases of polio and tetanus, but there is room for improvement in controlling other diseases, especially pertussis. Periodic outbreaks can cause rates of measles and rubella to vary from year to year. Measles and mumps outbreaks are often associated with exposures in countries with high rates of these diseases.				B

*NA = Currently not available

5. How Safe and Supportive Are Our Families?

Category	Indicators	Compared to U.S.	Trend	Disparities	Final
Are we planning for and spending time with our families?	Percent of pregnancies that are intended	NA	C	B	C
	Percent of families that regularly read to their young children	NA	NA	NA	NA
	Percent of 10th graders who report most of the time or always eating dinner with their family	NA	NA	B	B
Overall Grade	Given that there are only two indicators with grades, one of which has a grade for only one component, there are not sufficient data to assign an overall grade.				NA
Are our families safe?	Number of offenses involving domestic violence per 1,000 population	NA	C	NA	C
	Number of children reported as abused or neglected per 1,000 children	NA	C	F	D
Overall Grade	Given that there are only two indicators one of which has a grade for only one component, there are not sufficient data to assign an overall grade.				NA

6. How Healthy Are Our Behaviors?

Category	Indicators	Compared to U.S.	Trend	Disparities	Final
Do we smoke cigarettes?	Percent of adults reporting current cigarette smoking	B	A	C	B
	Percent of 10th graders who report smoking cigarettes in the past 30 days	A	A	C	B
	Percent of women who report smoking during the last 3 months of pregnancy	NA	B	F	D
Overall Grade	With about 20% of adults and 13% of 10th graders reporting smoking, Washingtonians smoke less than persons in the U.S. as a whole, and smoking in Washington has been declining. Smoking varies significantly by race and ethnic group. Smoking among Hispanic women during pregnancy is especially low, setting a high standard that other groups could achieve.				B

NA = Currently not available

6. How Healthy Are Our Behaviors? (Continued)

Category	Indicators	Compared to U.S.	Trend	Disparities	Final
Are we physically active?	Percent of adults who report meeting recommendations for moderate or vigorous physical activity through work or leisure	A	NA	B	B
	Percent of 10th graders who report meeting recommendations for vigorous physical activity	A	NA	B	B
Overall Grade	Washingtonians are more physically active than persons in the U.S. as a whole. However, like the U.S., there is much room for improvement; approximately 1/4 of 10th graders and 1/3 of adults are not physically active at levels recommended for maintaining good health.				B
Are we eating right?	Percent of adults who report eating fruits and vegetables 5 or more times daily	C	C	B	C
	Percent of 10th graders who report eating fruits and vegetables 5 or more times daily in the past week	C	NA	B	C
	Percent of 10th graders who report drinking 2 or more non-diet sodas yesterday	NA	NA	C	C
Overall Grade	The percent of Washingtonians eating fruits and vegetables at least 5 times each day is similar to the percent for the U.S. Based on the 23% eating fruits and vegetables 5 times each day in 2003, we estimate that about half of adults meet the recommended 5 servings daily. Despite much room for improvement, percents in Washington are not increasing.				C
Do we abuse alcohol?	Percent of adults who report having 5 or more alcoholic drinks on one occasion during the past 30 days	C	C	B	C
	Percent of adults reporting chronic heavy drinking in the past 30 days: women who report more than 1 drink per day and men who report more than 2 drinks per day	C	C	C	C
	Percent of 10th graders who report drinking any alcohol in the past 30 days	B	NA	B	B
Overall Grade	Levels of unhealthy drinking are similar among adults in Washington and the US. Although about a third of 10th graders reported drinking alcohol in the past 30 days in 2004, drinking among 10th graders has been somewhat lower in Washington than in the U.S. Rates of unhealthy drinking have generally been constant for adults in Washington.				C

*NA = Currently not available

Report Card Grading Criteria

Process

For the 2005 Report Card, the Washington State Department of Health assigned grades to the indicators based on the criteria and considerations outlined below. Building on earlier work, the criteria were developed by the Key Health Indicators Committee through a collaborative process with a technical committee at the Department of Health. The grades were reviewed by persons with expertise in the subject areas covered by the report card and by the Key Health Indicators Committee.

Definitions

- Categories: Broad health-related topics that are graded by combining grades for one or more indicators.
- Indicators: Measures of health status, health behaviors, and related factors, the measurement of which provides a perspective on health in Washington. Definitions for report card indicators are available at www.doh.wa.gov/reportcard
- Grading components: Areas in which indicators are measured and graded. The 2005 Report Card uses three grading components: 1) how rates in Washington compare to those in the United States, 2) whether rates in Washington are improving or getting worse, and 3) whether there are disparities among persons in different racial or ethnic groups. For future report cards, the Key Health Indicators Committee will consider adding grading components for how we compare to a goal or target and whether there are disparities based on social and economic factors.

- Rates: A rate represents the number of events per unit of population. Most often, rates for health outcomes are expressed as the number of events per 100,000 persons. Rates for behaviors are generally expressed as percents, which are rates per 100 persons. When comparing rates between two groups (e.g., Washington and the United States) or across time, it is common practice to adjust rates for differences in age structures between the two groups. For the 2005 Report Card, we have opted not to make these adjustments, because there are not substantive differences between grades based on adjusted compared to non-adjusted rates. For more information on the use of rates in health assessment, see http://www.doh.wa.gov/Data/Guidelines/Rateguide.htm

Indicator grading

For the 2005 Report Card, indicators are graded by assigning an A–F to each of the grading components defined above. Grades are assigned by applying the criteria described on the following pages to the data for each indicator. In addition, the complexity of the data and limitations of some data sets argue for considering a broader context in assigning some grades, such as similar data from other sources or data from similar sub-populations. These considerations are also described. Detail on the rationale for each grade and the data used in assigning grades is available at www.doh.wa.gov/reportcard

1) How do rates in Washington compare to rates in the United States?

Where possible, we compare Washington State rates to the rates for the United States for the three most recent years of data. For some indicators, the years of data for comparing Washington to the United States are earlier than those used for assessing trends and disparities because we have more recent data for Washington than we have for the nation as a whole.

Criteria for assigning grades

A Washington's rates are statistically significantly better than rates for the United States for each year of the three most recent years, OR Washington rates are the same as the United States, but both are doing as well as possible (see other considerations, below).

B Anything between A and C.

C Washington's rates are not statistically significantly different from rates for the United States for the three most recent years.

D Anything between C and F.

F Washington's rates are statistically significantly worse than those for the United States for the three most recent years.

Other considerations

- In the absence of rates for the United States, grades may be based on median values or rates for a subset of states.
- The grade may be based on fewer than three years of data if the broader context indicates that the data are stable and robust.
- The grading component is not graded if Washington and United States data are not comparable.
- The grade may be raised or lowered based on how the United States compares to other developed countries. For example, while Washington does well compared to the United States with regard to life expectancy and homicide, the United States ranks low among developed nations on these indicators.

- "As well as possible" is defined as follows:
  - Infectious disease: not more than three cases for the past three years.
  - Behaviors: 95% or more of the population engaging in healthy behaviors for at least three consecutive years.
  - Drinking water quality standards: not dropping below 97% for at least two consecutive years.
  - Air: 100% of the population is breathing clean air for at least three consecutive years.

2) Are rates in Washington improving or getting worse?

We are interested in recent trends, defined as the trend over the last five years. However, a longer time period is often necessary to understand the trend in the five most recent years. For example, indicators that are decreasing slowly may look like they are not changing if we look at a five year period only. Additionally, for data that are collected every other year, the most recent five years may have too few data points to assess a trend. Thus, we use the Joinpoint software developed by the National Cancer Institute to assess trends in data from 1990 forward. If the trend is not consistent for the entire time period, we base the grade on the trend for the most recent five years. Information on Joinpoint is available at http://srab.cancer.gov/joinpoint/.

Criteria for assigning grades

A The trend shows statistically significant improvement, OR the trend is not changing, but Washington is doing as well as possible.

B Washington does not meet criteria for an A, but a broader context indicates Washington is moving in the right direction.

C The trend is flat or with no consistent direction.

D Washington does not meet criteria for an F, but the broader context indicates Washington is moving in the wrong direction.

F The trend shows statistically significant worsening.

Other considerations

- If data are not available beginning in 1990, we use the earliest year of data available after 1990 to the present.
- If there are fewer than five data points, we either do not assign a grade or assign a grade based on at least three data points if the broader context indicates the data are stable and robust.
- A grade of C may be increased to a B or decreased to a D if the trend is marginally statistically significant (p>0.05 and <0.10), the average annual percent change is greater than 1.5%, and there are at least five years of data.
- "As well as possible" is defined the same as in "How do rates in Washington compare to rates in the United States?"

3) Are there disparities among persons in different racial or ethnic groups?

The collection of data on race and ethnic group varies across data sets and this variation has implications for how race and ethnic groups can be defined. For the 2005 Report Card, where possible, we assess racial and ethnic disparities using five groups: Hispanics, non-Hispanic American Indians and Alaska Natives (AIAN, NH), non-Hispanic Asians and Pacific Islanders (API, NH), non-Hispanic blacks or African Americans, and non-Hispanic whites. For some data sets, we include additional groups, such as multi-racial or other.

These classifications may change over time as data sets change their collection methods and as definitions of race and ethnic group change. It is important to note that the racial and ethnic groups are not homogenous in terms of cultural practices, socioeconomics, and other factors that affect health. More information on the use of race and ethnicity in health assessment is available at http://www.doh.wa.gov/Data/Guidelines/Raceguide1.htm

Where possible, we combine three consecutive years of data to decrease variability, and we require at least 30 persons in each race group for population-based data and 50 persons in each race group for survey data. The Key Health Indicator Committee opted to use guidelines issued by the Centers for Disease Control and Prevention (CDC),[1] to assess disparities. This method requires

identifying the largest statistically significant difference between groups. This is usually the difference between the group with the highest rate of adverse health events or behaviors compared to the group with the lowest rate. However, there are instances where the comparison between the highest and lowest groups is not significant due to relatively small numbers, but other comparisons are. If there is a statistically significant difference, there are disparities. Based on the CDC guidelines, we require that the rate for the group with the lowest levels of adverse health events or behaviors have adequate reliability.

Following the CDC guidelines, we then determine the magnitude of the disparity by computing a percent difference between the groups with the highest and lowest rates using the following formula when a high rate indicates high levels of adverse health events or behaviors

$$[(\text{highest rate} - \text{lowest rate})/\text{lowest rate}] \times 100 = \text{percent difference}$$

The highest and lowest rates are reversed when a high rate indicates high levels of a positive health event or behavior. The computation is adjusted when the health event or behavior is common, because in these instances, percent differences are not sensitive indicators of disparity. For example, since most adolescents graduate from high school, retention rates that range from 80%–95% for different race groups result in a 16% difference between the groups with the highest and lowest rates. With high school retention rates between 80%–95%, dropout rates range from 20%–5%, giving a 300% difference. In this instance, the 300% difference is used to determine disparities.

If there are disparities, the grade is based on the percent differences. The grade may be adjusted if, based on methods outlined in the CDC guidelines, there are statistically significant increases or reductions in the percent differences in the most recent time period compared to previous periods beginning in 1990 at the earliest (see Table 1). This method is more likely to find disparities than methods that compare each racial and ethnic group to a standard rate, such as the overall state rate, because the groups with the best and worst rates will be more different from each other than from the state rate. This method also makes the implicit assumption that we can all be as healthy as the healthiest group.

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[1] Centers for Disease Control and Prevention, Statistical Notes #25, Measuring Progress in Healthy People 2010, September 2004, available at http://www.cdc.gov/nchs/data/statnt/statnt25.pdf

Table 1: Criteria for Assigning Grades for Disparities

Grade	Basic criteria	Adjustment for decrease in disparities because groups with high rates of adverse health events or risk factors are improving	Adjustment for decrease in disparities because groups with low rates of adverse health events or risk factors are getting worse	Adjustment for increasing disparities
A	No statistically significant disparities.			
B	The percent difference between the highest and lowest groups is statistically significant and less than 100%.	Meet basic criteria for a C AND the current percent difference is statistically significantly smaller than in previous time periods.		
C	The percent difference between the highest and lowest groups is statistically significant and between 100% and 199%.	Meet basic criteria for a D AND the current percent difference is statistically significantly smaller than in previous time periods.	Meet basic criteria for an A or B AND the current percent difference is statistically significantly smaller than in previous time periods because rates have increased among groups with previously low rates of adverse health events or risk factors.	Meet basic criteria for a B AND the current percent difference is statistically significantly larger than in previous time periods.
D	The percent difference between the highest and lowest groups is statistically significant and between 200% and 499%.	Meet basic criteria for an F AND the current percent difference is statistically significantly smaller than in previous time periods.	Meet basic criteria for a C AND the current percent difference is statistically significantly smaller than in previous time periods because rates have increased among groups with previously low rates of adverse health events or risk factors.	Meet basic criteria for a C AND the current percent difference is statistically significantly larger than in previous time periods.
F	The percent difference between the highest and lowest groups is statistically significant and greater than or equal to 500%.		Meet basic criteria for a D AND the current percent difference is statistically significantly smaller than in previous time periods because rates have increased among groups with previously low rates of adverse health events or risk factors.	Meet basic criteria for a D AND the current percent difference is statistically significantly larger than in previous time periods.

Other considerations

- In the absence of three years of data, grades are assigned based on one or two years of data if there are a sufficient number of persons in each race group.
- If there are between 10 and 29 persons in population-based data or between 30 and 49 persons in survey data, a grade may be assigned if the broader context indicates that the data are stable and robust.

Averaging grades across grading components

To develop a grade for each indicator, we assign a 4 to an A, 3 to a B, 2 to a C, 1 to a D, and 0 to an F. We then add across grading components, divide by the number of grading components, and assign grades as follows:

- $> 3.5 – 4.0$: A
- $> 2.5 – 3.5$: B
- $> 1.5 – 2.5$: C
- $> 0.5 – 1.5$: D
- < 0.5: F

Grading categories

Categories are graded by averaging the numerical points assigned to each indicator and assigning a letter grade as specified. To assign a category grade, there must be grades for at least three indicators, each of which has data for at least one grading component. Category grades may be assigned based on fewer indicators if each indicator has grades for at least two grading components.

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